INTT Preparation Status and Plan

RIKEN/RBRC

Itaru Nakagawa

Schedule

- ~ end of March : INTT ladder commissioning with calibration
- 1st ~ 2nd week of April : Daily calibration
  - Any activities doesn't require platform access?
    - LV Distribution module install for beam clock board power (Steve) and implementation of control to ROC LV GUI (Mai/Maya)
    - Polish up LV GUIs, GUI control of the filter module (Steve/Wei-Che)
    - Database developments for the calibration, mapping, online parameters
      - sPHENIX sphnxdbmaster (Martin)
    - Felix development
    - Expert GUI
  - ROC spare testing in the silicon lab
  - Software developments
  - 25cm Conversion cable assembly?
  - Integration of the mapping spreadsheets -> SQL database
  - Preparation for the beam commissioning.
- 4th week : preparation for expert shift

LV/Bias Control

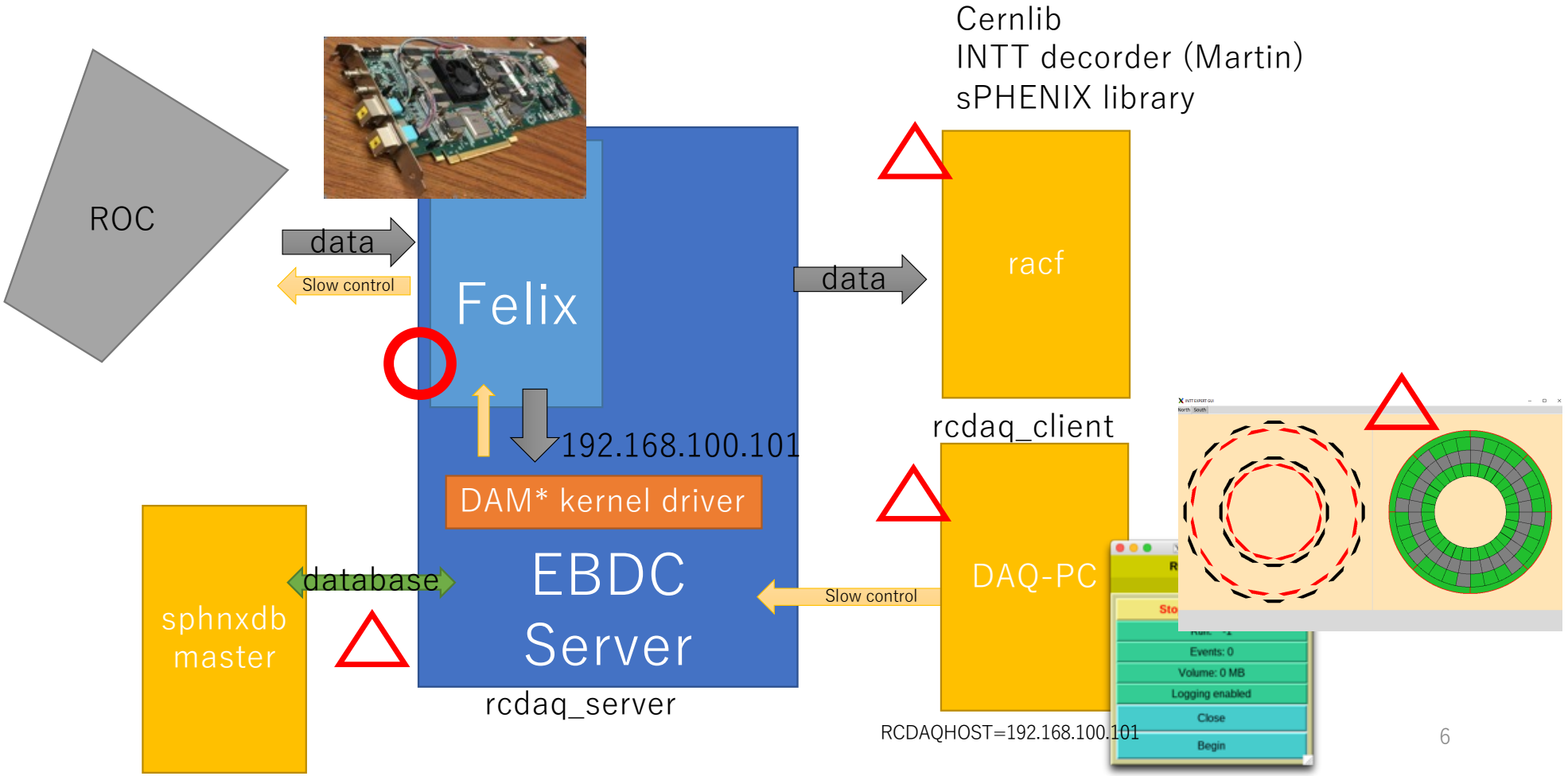
	GUI Status	Control	Trip Limit	Warning Threshold	Recording
Bias	✓	✓	✓		
ROC LV	✓	✓	N/A?	Mai/Maya	
FPHX Power (Distribution Module)	✓	✓	N/A?	Jaein	
FPHX Power (Filter Module)	✓	Steve			

Recording Stratagy

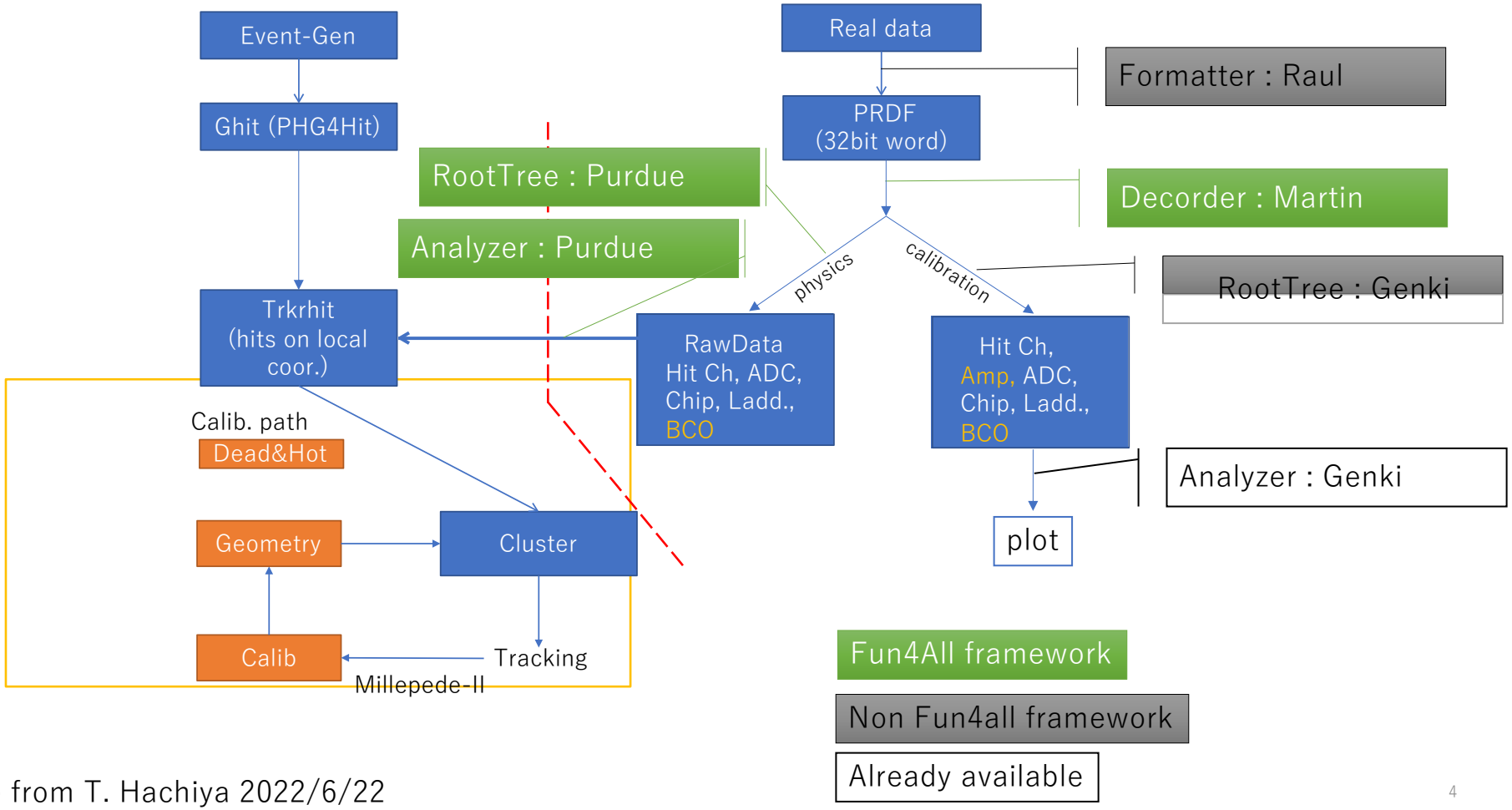
- Contact with Steve for his plan how to log current/voltage values measured current/voltages.
- These values supposed to be saved in HV/LV database.
- Portable chart application to monitor the stability (sPHENIX responsibility)
- Based on the stability, we may want to optimize the warning threshold. (INTT Group responsibility)

DAQ Development status

1008 DAQ Configuration



Data Flow for INTT clustering in real data



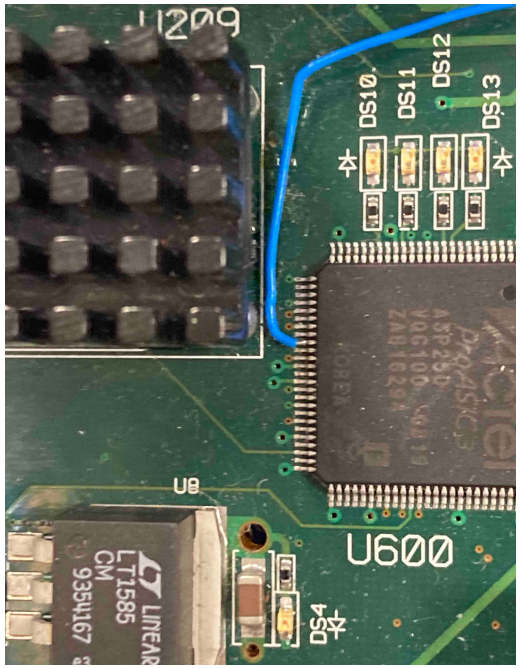
Slide from T. Hachiya 2022/6/22

ROC Spares

ROC#6

- Original Class-1 RC-0S ROC (replaced by ROC#26)
- Blue jumper cable was broken during installation or commissioning.
- Sal fixed the soldering.
- To be tested at the silicon lab as the 1st choice spare in near future.

Blue Jumper

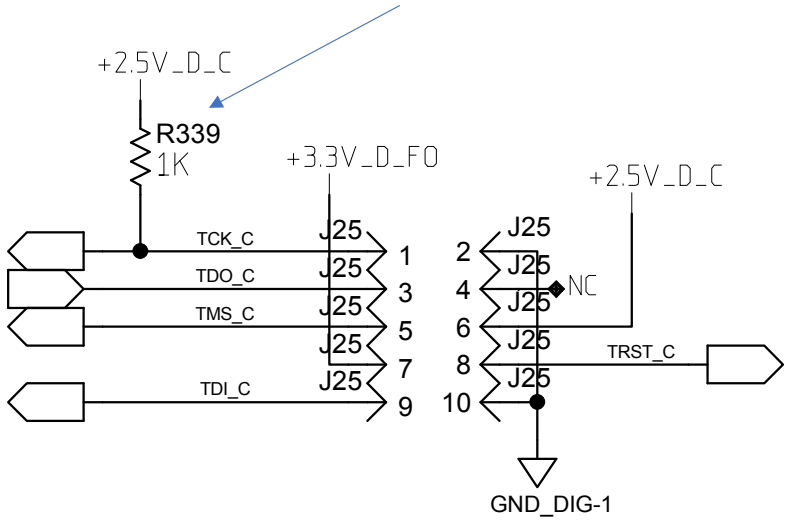


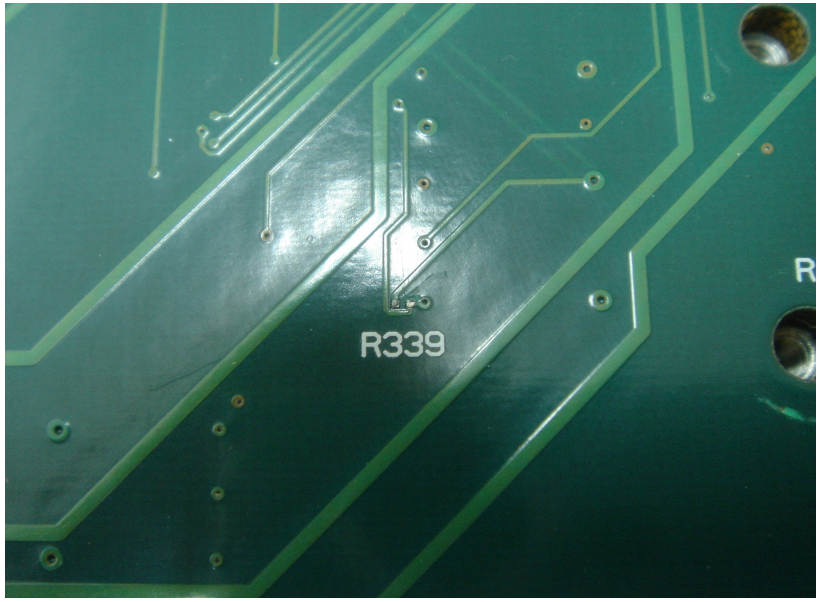
ROC Spare

- ROC#11
  - Originally used in Taiwan
  - Unupgraded regulators for FPHX.
  - Attempted to upgrade regulators in BNL, but gave up due to a half years of lead time to get regulators in US market.
  - Itaru hand carried it back to Japan and it is under regulator replacement by Japanese company. They have ~50 regulator stocks.
  - Found a missing register in Column-C circuit. (harmless for normal operation, but to be recovered).
  - Expected delivery in the first week of April.
  - Itaru will again hand carry it to BNL on April 10th.
  - To be tested in RIKEN as much as we can after the delivery.

R339

ダンピング抵抗



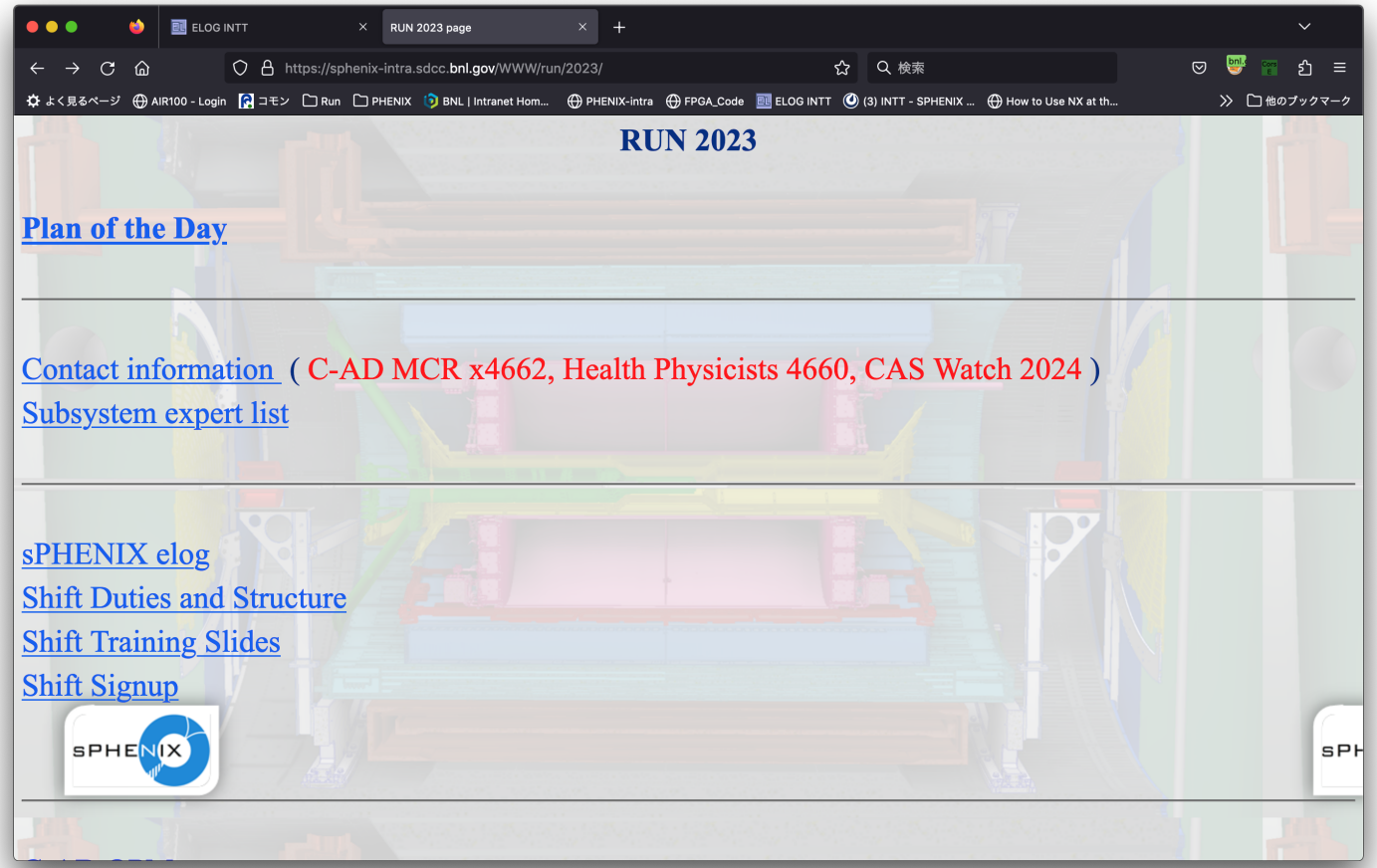


J25: JTAG port for Data FPGA-C
TCK : Clock

	Original	Alternative
R339	CRCW02011K00FNED	RK73H1JTTD1001F

代用品で問題ないと判断し、RK73H1JTTD1001Fを採用

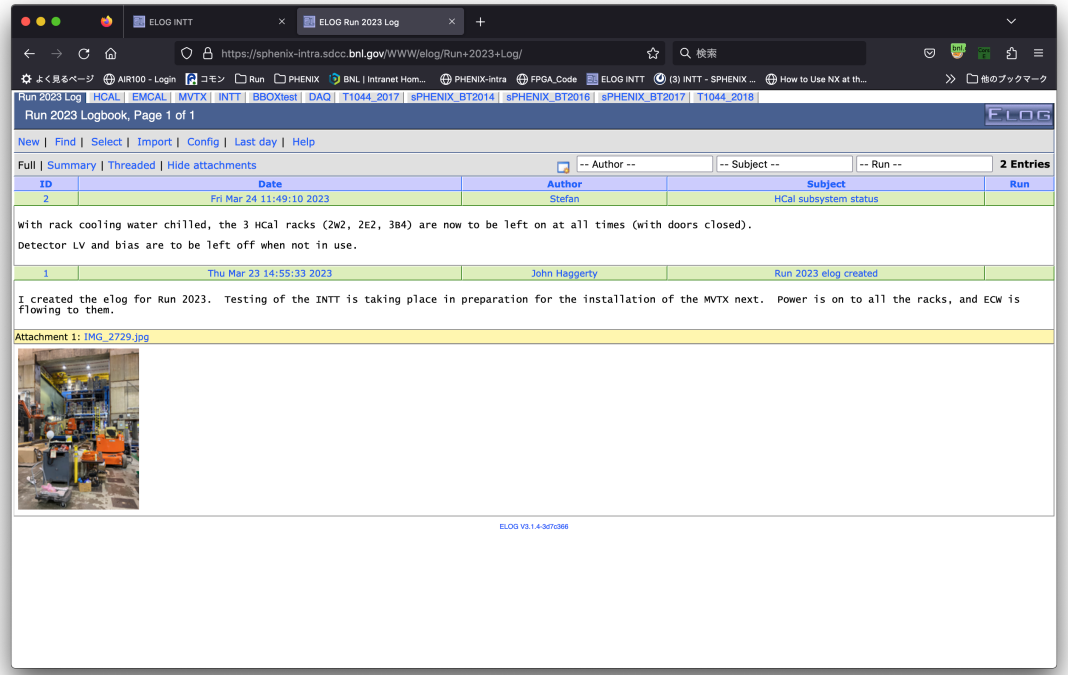
Run-23 Page



https://sphenix-intra.sdcc.bnl.gov/WWW/run/2023/

sPHENIX e-log

https://sphenix-intra.sdcc.bnl.gov/WWW/elog/



https://sphenix-intra.sdcc.bnl.gov/WWW/elog/Run+2023+Log/